Kansas Weekly Influenza Surveillance Report
2019-2020 Influenza Season
Week 17: April 19 – April 25, 2020

(All data are preliminary and may change as more information is received.)

Kansas Influenza Geographic Spread*				
No Activity	Sporadic	Local	Regional	Widespread

*Based on CDC's activity estimates definitions: http://www.cdc.gov/flu/weekly/overview.htm

Summary Stats	
Percent of outpatient visits for ILI[1]	2.1%
Percent of emergency visits due to ILI[2]	1.9%
Number of influenza outbreaks reported (Cumulative)	31
Influenza-associated mortality – all ages (Cumulative)[4]	136
Influenza-associated pediatric mortality (Cumulative)	4

[1]Influenza-like Illness (ILI): a fever of ≥100°F as well as a cough and/or sore throat. Data from U.S. Outpatient Influenza-like Illness Surveillance Network (ILINet)

[2]Emergency visits due to ILI are collected by syndromic surveillance (ESSENCE) received from Kansas hospitals

[3]Hospitalization rate due to influenza-like illness is calculated using ESSENCE data

[4]Deaths are considered influenza-associated when influenza is listed on the death certificate, either as a direct cause or contributing factor

About Influenza Surveillance in Kansas:

Kansas regulations do not require health care providers to notify KDHE when a patient is diagnosed with influenza. Instead, influenza activity is measured through ILINet and syndromic surveillance. Each week, ILINet clinics determine the percentage of patients seen with ILI. Data is collected Sunday through Saturday of each week. The Electronic Surveillance System for the Early Notification of Community-Based Epidemics (ESSENCE) is a syndromic surveillance system for capturing and analyzing public health indicators in near real-time for detection of disease outbreaks. This data is analyzed weekly to determine the percentage of visits to emergency departments that are due to ILI. Influenza surveillance in Kansas also consists of laboratory testing, mortality data, and outbreak reporting.

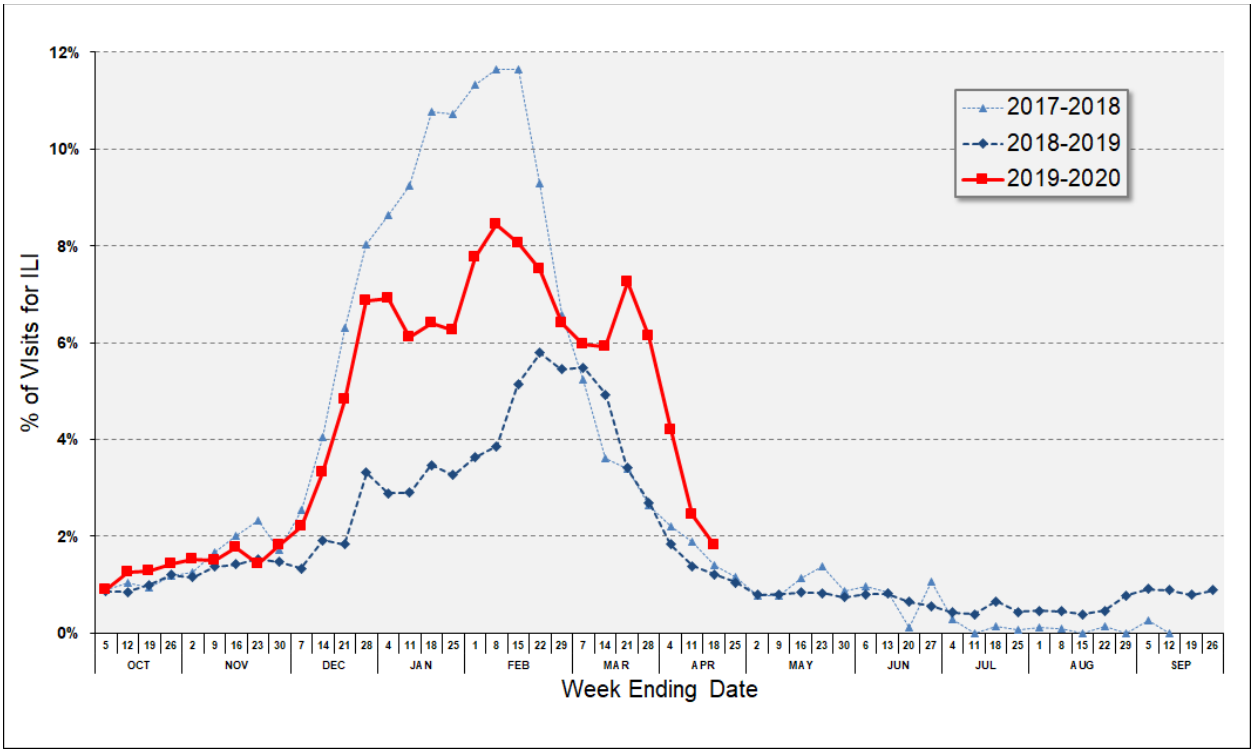
Outpatient Influenza-like Illness Surveillance

Outpatient health care providers, including family practices, student health centers, emergency departments, and pediatricians participate in ILINet by reporting the number of patients seen with ILI and the total number of patient seen for any reason each week. Kansas health care providers interested in joining ILINet should contact Amie Cook at 785-296-2898 or amie.cook@ks.gov.

Table 1. Outpatient Visits for ILI Reported by ILINet Facilities by Age Group

Week	Age 0-4	Age 5-24	Age 25-49	Age 50-64	Age >64	Total ILI	ILI Percent
Week 15, ending Apr 11	12	23	76	34	22	167	2.4%
Week 16, ending Apr 18	10	22	47	16	17	112	1.8%
Week 17, ending Apr 25	6	26	49	25	23	129	2.1%

Figure 1. Percentage of Visits for Influenza-like Illness (ILI) Reported by ILINet Sites, Kansas, September 2019 - September 2020 and the Previous Two Surveillance Periods



ILINet sites may vary in number and type each season. Data from the previous two surveillance years are plotted according to week number corresponding to the 2018-2019 week ending date; for example, week 40 of 2019 ended October 6, 2019, week 40 of 2018 ended October 6, 2018, and week 40 of 2017 ended October 7, 2017.

22 of 36 (61%) sites submitted data by the reporting deadline for the current week.
(Additional submissions may be received after Tuesday's deadline which may affect future reports.)

Emergency Department Syndromic Surveillance

Figure 2. Percentage of Visits for ILI reported to ESSENCE, September 2019 – September 2020 and the Previous Two Surveillance Periods

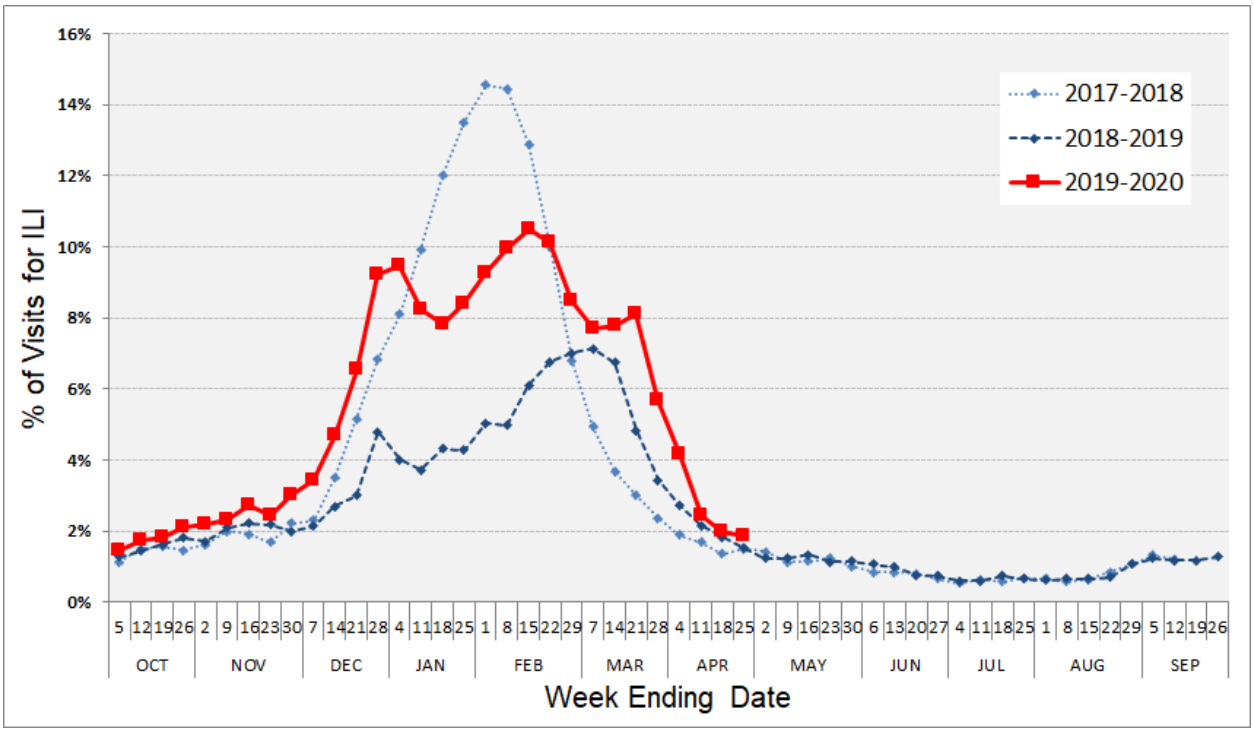
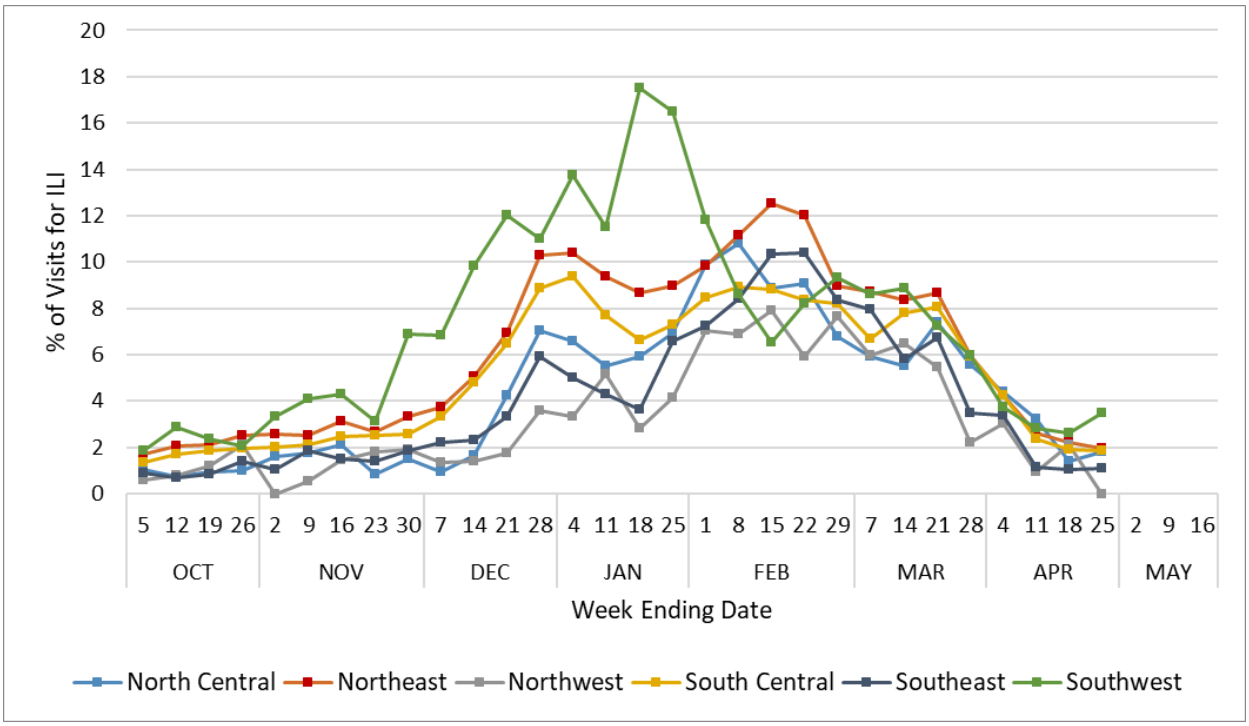


Figure 3. Percentage of Visits for ILI reported to ESSENCE by Kansas Region, September 2019 – May 2020



Laboratory Surveillance

The Kansas Health and Environmental Laboratories (KHEL) provides confirmatory testing for ILINet site patients with ILI, as well as for hospitalized patients throughout the state. Real-time reverse transcription polymerase chain reaction (RT-PCR) tests were used to analyze nasal and nasopharyngeal swabs for the presence of influenza virus. KDHE also partners with several large hospitals in Kansas to submit up to 20 prescreened positive influenza A specimens each week.

Figure 5. Influenza Specimens Tested at KHEL by Week Ending Date, October 2019 – Present

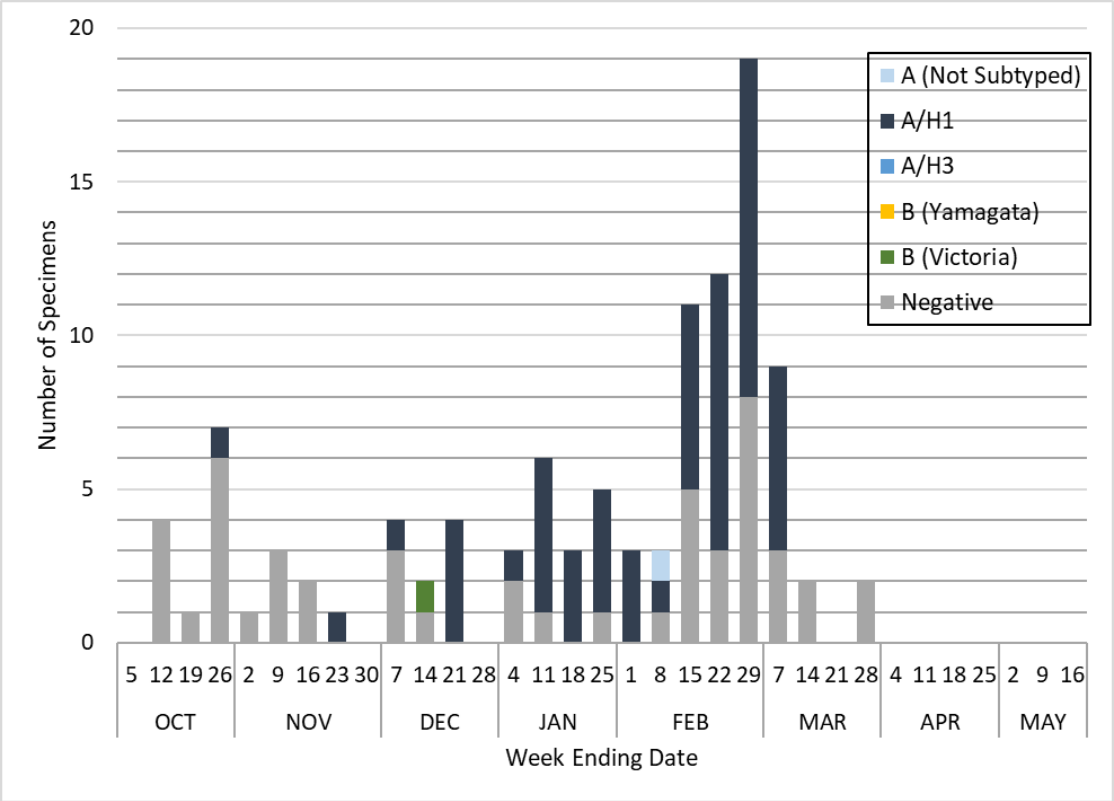


Table 2. Laboratory-Confirmed Influenza Viruses from Specimens at KHEL by Subtype, October 2019 – Present

Influenza subtype	Number	Percent of Total
A/H3	0	0%
A/H1	56	97%
A (not subtyped)	1	2%
B (Yamagata)	0	0%
B (Victoria)	1	2%

Influenza-Associated Deaths

Table 3. Kansas Resident Pneumonia & Influenza Related Deaths by Entire Flu Seasons by Causal Relationship

	Season					
	2017-2018		2018-2019		2019-2020	
	N	Percent	N	Percent	N	Percent
Influenza – Contributing Factor in Death	46	2.7	24	1.7	26	2.0
Influenza – Direct Cause of Death	196	11.4	73	5.1	110	8.5
Pneumonia – Direct Cause of Death	363	21.1	368	25.6	326	25.2
Pneumonia– Contributing Factor in Death	1117	64.9	974	67.7	832	64.3
Total	1722	100.0	1439	100.0	1294	100.0

Influenza Outbreaks

While influenza is not a reportable disease in Kansas, outbreaks of any disease are reportable under K.A.R. 28-1-6.

Definition of an influenza outbreak in a long-term care facility:

1. Two or more residents in close proximity to each other (e.g. same hall or community) who develop symptoms of ILI within 72 hours; OR
2. One laboratory confirmed influenza case and other residents with ILI in close proximity to each other

As of Week 17, 31 influenza outbreaks have been reported to KDHE.

Additional Influenza Data Sources

Centers for Disease Control and Prevention: National Influenza Surveillance (FluView): http://www.cdc.gov/flu/weekly/fluactivitysurv.htm

The National Respiratory and Enteric Virus Surveillance System (NREVSS): http://www.cdc.gov/surveillance/nrevssWorld Health Organization: International Influenza Surveillance: http://www.who.int/influenza/surveillance_monitoring/en